DOCUMENT RESUME

ED 162 046 UD 018 842

AUTHOR	Wolf, Wendy C.; MacDonald, Maurice
TITLE	The Earnings of Males and Marital Disruption. Discussion Paper No. 504-78.
INSTITUTION	Wisconsin Univ., Madison. Inst. for Research on Poverty.
SPONS AGENCY	National Inst. of Mental Health (DHEW), Rockville, Md.
PUB DATE	Jul 78
GRANT	MH-06275-16
NOTE	33p.
EDRS PRICE	MF-$0.83 HC-$2.06 Plus Postage.
DESCRIPTORS	*Economic Factors; *Financial Problems; *Income; Longitudinal Studies; *Males; *Marital Instability; *Wages; Welfare

ABSTRACT

It has been argued that extending welfare benefits to two-parent families may reduce marital disruptions by increasing the absolute level of males' earnings. The premise behind this assertion is that an increase in the absolute level of male earnings will reduce economic strain in the marriage, and the wife will perceive more gains from remaining in the married state. Unfortunately, the literature in this area has not definitively shown that it is a man's absolute level of earnings, rather than some other aspect of his earnings, that affects marital disruption. This paper assesses the effects of several aspects of the husband's earnings on marital disruption: (1) absolute level of earnings; (2) earnings instability; (3) earnings relative to peers; and (4) "permanent income." Other relevant variables known to affect marital disruption are held constant. The data are the Wisconsin longitudinal study of a cohort of high school seniors that were reinterviewed at age 35. The unique aspect of the data is the presence of detailed earnings histories. (Author/GC)

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#504-78

INSTITUTE FOR RESEARCH ON POVERTY DISCUSSION PAPERS

THE EARNINGS OF MALES AND MARITAL DISRUPTION

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UD018842

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July 1978

We gratefully acknowledge the computational assistance of Dan Dodds, Nancy Bode, Harold Varnis, and John Flesher. We thank William Sewell and Robert Hauser for permitting us access to these data. The cooperation of the Social Security Administration and Carol Cole at the Madison Area Computer Center made the analysis in this paper feasible. This research and these computations were supported by grants from National Institute for Mental Health (MH-06275-16), a Center for Population Research Grant (HD 05876) to the Center for Demography and Ecology from the Center for Population of NICHD, a grant from NICHD (1-R01-HD-10751-01), and by the Institute for Research on Poverty, University of Wisconsin, Madison. Of course, any remaining faults are our own.

ABSTRACT

It has been argued that extending welfare benefits to two-parent families may reduce marital disruptions by increasing the absolute level of males' earnings. The premise behind this assertion is that an increase in the absolute level of male earnings will reduce economic strain in the marriage, and the wife will perceive more gains from remaining in the married state. Unfortunately, the literature in this area has not definitively shown that it is a man's absolute level of earnings, rather than some other aspect of his earnings, that affects marital disruption. In this paper we assess the effects of several aspects of the husband's earnings on marital disruption: (1) absolute level of earnings; (2) earnings instability; (3) earnings relative to peers; and (4) "permanent income." Other relevant variables that are known to affect marital disruption are held constant. The data are the Wisconsin longitudinal study of a cohort of high school seniors that were reinterviewed at age 35. The unique aspect of the data is the presence of detailed earnings histories. The use of these data allows us to overcome many of the problems with the past research in this area.

The Earnings of Males and Marital Disruption

1. INTRODUCTION

The sharp rise in female-headed families is a serious social issue mainly because these families run a very high risk of living in poverty. The increase in the divorce rate has been found to be the most important factor in the growth of female-headed families from 1960 to 1970 (Ross and Sawhill, 1975). In particular, many are concerned about the extent to which economic factors are responsible for that dramatic rise. One predominant fear of policymakers is that current welfare policies are implicated in this dramatic rise in female-headed families, since restricting welfare benefits to single-parent families may increase incentives for divorce and tend to inhibit remarriage, by decreasing the overall gains from marriage (MacDonald and Sawhill, 1978). Welfare reform proposals that provide benefits to two-parent families may be an improvement, for two reasons. First, since married as well as unmarried individuals would receive benefits, there presumably would be reduced incentives to split from one's spouse and greater incentives to remarry. Experimental evidence on this point is, however, ambiguous (see MacDonald and Sawhill, 1978, for an extensive review of the evidence). A second potential benefit is that aiding two-parent families would increase the absolute level of males' earnings, reducing economic strains affecting marriages, so that women would perceive greater advantages from remaining married. Again, however, the available empirical evidence has not definitively shown that it is men's absolute level of earnings that affects

marital disruption, and not other aspects of their earnings that would be left unaffected by welfare reform.

This paper assesses the effects of several aspects of the husband's earnings on marital disruption, in an effort to shed some light on the extent to which reforming welfare may reduce the stock of female-headed families. Aspects of the husband's earnings considered here include the absolute level of his earnings, earnings instability, his earnings relative to those of his peers, and his permanent income. Furthermore, we are able to overcome most of the serious inferential problems of previous research on the economics of divorce.

We begin by reviewing the literature on the husband's earnings and marital disruption, paying particular attention to the problems of existing research. After a brief discussion of our theoretical framework, we then present our analytical strategy. A discussion of the sample and variables is followed by our empirical results.

2. PAST RESEARCH ON INCOME AND MARITAL STRATEGY

During the last decade, there has been abundant research on the effects of socioeconomic status (broadly defined to include income, social class, etc.) on marital instability. Several early papers indicated that income and marital stability were negatively related and posited numerous possible explanations for this association (Bernard, 1966; Cutright, 1971; Udry, 1966; Carter and Glick, 1970; Glick and Norton, 1971). Because of methodological problems, however, these studies are merely suggestive: they do not confirm the effects of income on marital instability.

In the first place, current income was often used to predict previous marital instability; thus one cannot infer whether "income effects" are the result of income affecting marital instability, or vice versa. Secondly, most of the studies excluded some of the noneconomic factors known to affect marital disruption, and usually studied only one aspect of family income. Finally, in some studies based on aggregate data, the dependent variable used was the number of divorced persons; this compounded the effects of remarriage probabilities with the probability of divorce.

The next important development in the literature was to decompose the family income effect into two separate components with opposite effects: independence effects and income effects. If family income is divided into husband's earnings as opposed to the wife's earnings and her other income, it was aruged that the higher the wife's earnings (or availability of transfer payments to her) the more likely it is that the marriage will be unstable. This is typically called an independence effect, as it is supposed that the higher a woman's own income, the less she may gain from marriage, and the more favorably she may view being single. It was, however, also hypothesized that husbands with higher income are more likely to have stable marriages. The research disentangling these two effects suggests that the independence effect is quite strong and that the effect of the absolute level of the husband's income is less so (see, for example, Ross and Sawhill, 1975; Cherlin, 1976; Becker, Landes, and Michael, 1977).

Attempts to understand how the husband's income affects marital stability have also contributed to recent advances. Most notably, Ross and Sawhill (1975) designed their analysis to determine what aspect of husband's income is most crucial with respect to marital disruption. The question they posed is whether it is the absolute level of husband's earnings or the associated implications of this level for the wife's assessment of his performance as a breadwinner that matters most. The hypothesis is that women have certain expectations about the way a husband will provide for the family, and that any large deviations from expected performance (in either direction) may destabilize the marriage. The strong effects of Ross and Sawhill's role performance measures tend to confirm this hypothesis. When the husband had serious spells of unemployment, when he was unsuccessful, or was much more successful than expected, disruptions were more frequent. (Of course, this is also consistent with other interpretations of the manner by which earnings instability generates marital instability.) Still, there are some questions left unanswered by the work of Ross and Sawhill:

1. They did not have any direct evidence of earnings instability.
2. They could not inspect how the effects of these different aspects of male earnings varied over the course of the marriage, because their sample was a cross-section of marital durations and they did not allow marital duration to interact with the earnings variables under investigation. Glick and Norton's work (1971) suggests that income level has its strongest effects during the first ten years of marriage. They commented:

"Variations in the probability of divorce by income level were not very large among those who had been married at least 10 years. Perhaps noneconomic problems predominate as factors in divorce among those married for a rather long time" (p. 316). If this is the case, it is possible that Ross and Sawhill's finding that absolute level of earnings has no effect is caused by the averaging of a strong effect early in marriage and no effect later in marriage.

3. Poor current performance might be discounted by wives who expect their husbands will achieve compensating gains on a permanent income basis.

One recent study, by Becker, Landes, and Michael (1977), does try to discern how the effects of the husband's earnings vary over the course of the marriage. However, because these researchers used the husband's current income to predict dissolutions occurring in the past, the dynamics of the income--marital-instability relationship are left ambiguous.

In summary, over the last decade we have learned a considerable amount about the relationship between income and marital instability. Yet several questions remain unresolved. Is poor role performance less important early in marriage when the husband has a high permanent income? How do the effects of various aspects of the husband's earnings vary over the course of the marriage? Is there any evidence at any point in the marriage that the absolute level of the husband's earnings has an effect on marital instability when other aspects are held constant?

3. OUR APPROACH AND ANALYTICAL STRATEGY

In an attempt to answer these questions, we have adopted a theoretical framework that follows Ross and Sawhill's attempt to bridge the gap between academic disciplines. We conceive of marriage as a social and pscyhological, as well as economic, institution. When the psychological, social, and economic benefits of remaining married are less than perceived benefits of being unmarried, a couple will experience a marital disruption. Under this rubric, we shall ascertain the effects of male earnings on marital instability while holding constant sociocultural and psychological factors.

In choosing our analytical strategy, we searched for a mechanism by which we could meet our two goals: (1) ascertain the effects of husband's earnings on marital instability; and (2) discover how these effects vary over the course of the marriage. It was decided to predict the probability of marital disruption during each of the first two four-year periods after marriage.[1] This strategy allows us to determine how the effects of explanatory variables vary over time. Other strategies, such as simply predicting whether or not sample members ever disrupt, or a "spell analysis" (Hannan, Tuma, and Groeneveld, 1976) where time is divided into intervals and observations are then pooled across intervals, have the disadvantage of imposing the assumption that some independent variables have constant effects over time. In addition, other commonly used strategies have the potential for producing measured income effects that confound the impact of incomes on disruption with any impacts of disruption on income.

Since our strategy requires analysis of the probability of disruption for four-year periods, we encounter the well-known econometric problems associated with estimation based on a dichotomous dependent variable for a rare event (see Goldberg, 1964; Nerlove and Press, 1973). In this situation, accurate estimation necessitates a logit, probit, or log-linear analysis. We chose logit, estimated with a maximum likelihood routine, to avoid the restrictions of the other methods (Hanushek and Jackson, 1977; Nerlove and Press, 1973).

4. DATA, SAMPLE, AND VARIABLES

The data are from the Wisconsin Study of Social and Psychological Factors in Socioeconomic Achievement, a longitudinal, random sample of 10,317 persons who were Wisconsin high school seniors in 1957 (Sewell and Hauser, 1975). The original interview was in 1957 and was complemented by information from schools as well as parental income measures from Wisconsin tax data. A follow-up study was executed in 1975, completing interviews of 9,138 respondents, or 88.5 percent of the original sample. Among other things, these interviews obtained detailed marital and fertility histories. Furthermore, for all male members of the 1957 Wisconsin cohort, we have Social Security earnings records by year from 1957 through 1971. There are elaborate procedures to protect the identity of individuals. The data for the analysis reported here are drawn from all these sources. Using this data set means that one cannot generalize the results to those who are not high school graduates.

The basic sample used here is restricted to all males in the cohort who were interviewed in 1975 and for whom we have social security records (unfortunately, there are no earnings histories for sample women or for their husbands). Furthermore, we omit men who never married, whose first marriage ended in widowhood, and for whom data on the date of first marriage were missing. Attrition due to failure to contract a first marriage or to missing data was minimal: We lost less than 16% of the original 1957 sample through missing data of any kind. For each four-year analysis period, we omitted from the sample for that period anyone who had experienced a marital disruption in an earlier period, along with anyone whose marriage did not last as long as the end of the period by virtue of truncation due to date of interview. Attrition for these two reasons was not serious. At any rate, attrition due to an earlier disruption was of no concern because we wanted to inspect the effects of certain variables on disruption over a given period, provided there had been no previous disruption. Finally, our analysis was restricted to the first eight years of marriage because attrition due to marital duration becomes a serious problem thereafter.

The dependent variable for these analyses was a dummy variable scored 1 if the man separated from his first spouse during a given four-year period. Our measure of marital disruption or instability was separation rather than divorce, since it is possible that some individuals do not officially terminate their marriages (i.e., get a divorce) until they have concrete plans for remarriage (see Sweet, 1973). Furthermore, we limited our analysis to disruption in first marriages since the number of people who had second or higher-order marriages was quite small.

Three kinds of variables are often used to tap independence effects for wives: number of children, availability of welfare benefits, and the wife's (potential) earnings. We refrained from including the first of these, though the information was available, because of a potential problem of endogeneity. Since over 70% of the sample resides in Wisconsin, we did not include a welfare variable, which would have little variance and hence reduced predictive power.

We have limited information on the male's first spouse with which to construct a potential earnings measure. Given the first wife's educational attainment at marriage, we assigned each wife an earnings value (in hundreds of dollars) which was the mean earnings of all women in the 1960 Census who had a similar educational attainment, who were also living in the North Central region of the country, had ever been married, white females who worked full-time in 1960 and full-year in 1959, and were of the same age range as our sample wives. These values represent the potential full-time earnings of the wife at the time of marriage and proxy for earnings potential thereafter. We did not have sufficient information to vary the wife's potential earnings over the span of the marriage. Other, more sophisticated techniques for computing the wife's potential wage at marriage (Hout, 1978; Heckman, 1974) were also precluded because we did not even know the wages of those spouses who worked. Although using our potential earnings variables had disadvantages, it has been argued that the use of actual earnings would be a less rigorous test of the independence effect because women may raise their

actual earnings by increasing hours of market work in anticipation of marital disruption (Ross and Sawhill, 1975).

Although recent evidence suggests that the gross level of the husband's earnings is not as important as other aspects of male earnings, it is imperative that such an analysis include gross earnings because (1) it is possible, as already noted, that the lack of an absolute earnings effect on marital instability was a result of averaging divergent effects over varying marital durations; and (2) others have posited numerous theoretical arguments that absolute earnings should affect marital instability. They argue that (a) individuals with high earnings probably incur high costs in disrupting a marriage, owing to their correspondingly larger commitments in shared consumer durables, investments, etc.; (b) the legal costs of disruption for couples in lower socioeconomic strata are relatively low; (c) strained marital relationships presumably decline as earnings rise. For each analysis period, therefore, we included the level of the husband's earnings for the previous year, obtained from the Social Security records, and expressed it in hundreds of constant 1972 dollars (Economic Report of the President, 1975). The abbreviation for this variable is ABS.

To tap the strains on marital relationships stemming from earnings instability, we calculated the ratio of the previous year's earnings to "normal" earnings, defined as the average of earnings received during the four years prior to the analysis period. Our intent in thus expressing the deviation relative to normal earnings was to account for our presumption that the impact of earnings instability depends on its magnitude with respect to normal earnings. Two dummy variables were created for use

as explanatory variables, one indicating whether the ratio exceeded 1.40 (AN, or above normal) and another (BN, below normal) for respondents whose ratio was less than .90 (the cut-off points are not equidistant from 1 since this is a period of men's lives when their earnings increase quite rapidly--Mincer, 1974; Sørensen, 1975).

In addition to indicating economic stress, one might argue that our earnings instability measures also reflect the wife's assessments of her husband's role performance. However, it seems likely that wives know whether their husbands are earning more or less than peers with similar characteristics, and that they judge the adequacy of their husbands' role performance by these criteria. We calculated the ratio of the man's earnings in the year prior to the period of observation to his "expected" earnings--that is, the earnings he would have received if he had the same rate of return to productive attributes as his peers. To obtain the denominator of this ratio, we estimated the parameters of a regression of absolute earnings in that period on whether or not the respondent was raised in a town of less than 2500 persons, his IQ score, normalized rank in high school class, whether he was enrolled in a college preparatory program, his age at first marriage, and his educational attainment level in the year previous to analysis. We then used these parameters to obtain a predicted value for each individual. Implicitly, then, the peers we had in mind are those of similar intelligence, school preparation, age at marriage, and educational attainment. For analysis, our two dummy variables were Expect Less (EL) when earnings relative to peers exceeded 1.25, and Expect More (EM) when relative earnings were less than 0.75.

It seems reasonable that at certain stages of the marriage, a wife may discount how her husband's earnings compare to his peers if her husband's long-run permanent income is quite high. For example, a wife may discount current performance if her husband is in school or training; these activities would increase his long-run earnings potential and presumably increase her gains from remaining in the married state. Since the decision to end a marriage has long-term consequences, it may be that long-run economic prospects are most relevant. Thus our long-run permanent income variable (LRP) predicted the husband's earnings at age 45, multiplying his report of total income in 1974, when he was about age 35, by a ratio of average incomes earned at age 45 to average income at 35, for men in his three-digit 1974 occupation. This ratio was derived from an extract of the 1970 Census public use sample for a population of men with characteristics similar to those of our sample.[2]

In brief then, we analyzed the effects of the husband's absolute level of earnings, his earnings relative both to his normal experience and to those of his peers, and the permanent income he could expect in the long run.

The remaining independent variables represented social norms about divorce, or indicated psychological states affecting marital harmony. For social norms, there were two variables: religion (REL) and rural origins (RUR). REL is a dummy indicating that the respondent's family was Catholic. We do know the religion of the respondent in 1975, but the earlier measure seems more appropriate for young couples. Furthermore, it is conceivable that religious affiliation in 1975 could have

been affected by marital dissolution or subsequent remarriage. The rural-origin dummy indicates respondents who were raised in towns of fewer than 2500 people. Both categories should relate negatively to disruption, since the cultural environments they connote have traditionally fostered strong norms against divorce. Other standard variables reflecting differing social norms were not included, because the sample is quite homogeneous with respect to such variables as race and region of the country.

Similarity in values and interests may increase the psychological benefits of marriage, or promote harmony. Those who marry young have invested less time in searching for a partner with similar characteristics, and we hypothesize that they are more likely to disrupt. Hence, AGLT represents husbands who married before age 20. In the same vein, premaritally pregnant women often marry hastily, and the resulting matches may be less than optimal. PC, a dummy variable for premarital conception, accounts for hasty matches, by indicating that the couple's first child was born before the seventh month of marriage. More direct information about couples with divergent characteristics also entered our analysis. AGDS measures the absolute difference in ages between spouses. Finally, EDDS is the absolute difference, between spouses, in years of formal schooling completed.

5. RESULTS

Although the use of logit analysis (estimated through a maximum likelihood routine) solves many of the econometric problems involved with a dichotomous dependent variable, others remain. In particular, when the

event to be studied is quite rare, the actual number of people who experience such an event is small even when the sample is of substantial size (3500). Hence there is the troublesome possibility that parameter estimates might reflect the idiosyncratic behavior of a few individuals, rather than an underlying process. To avoid this problem, we had to trim the number of explanatory variables selectively. The process of reducing the numbers of variables involved estimating ordinary least squares regressions and logits using the full roster of variables. Those variables that consistently lacked statistically significant and/or substantively important effects were eliminated from the equations. Three of the original variables tapping the psychological benefits from marriage were excluded. First, the age and education differences between the spouses never exhibited statistically significant effects, perhaps because we did not differentiate between large differences favoring the husband and the wife. One might posit that a large age or education difference favoring the wife would be destabilizing. Since our sample had so few cases where the age or education difference favored the wife, it was not feasible to construct separate variables for differences favoring either spouse. Secondly, whether the first birth was a premarital conception had quite weak effects, net of husband's age at marriage and earnings. Whether the respondent was of rural origin, a variable tapping the sociocultural norms against divorce, was excluded as its effects, though sometimes statistically significant, were substantively quite small. Only one indicator of the independence effect was included in the original model: the wife's potential earnings, which had small, unpredicted, negative

effects on marital disruption (Ross and Sawhill, 1975). It should be recalled that our measure of the wife's potential earnings was a transformation of her educational attainment. While the wife's potential earnings should have a positive effect on marital disruption, there is some evidence that her educational attainment at marriage is negatively related to marital instability (see Bumpass and Sweet, 1972, Table 1; and Becker, Landes, and Michael, 1977, for ambiguous results concerning the effects of the wife's education). One explanation for our weak and conflicting effect of "female independence," then, may be that our measure taps the wife's educational attainment more than her potential earnings. Alternatively, the coefficient in question may merely be an average of a positive and a negative effect. In any event, because of this ambiguity about our measure of wife's potential earnings, we omitted this variable from our final models.

We are left with the following two models:

DIS = f(CAT, AGLT20, LRP, ABS, EL, EM)

DIS = f(CAT, AGLT20, LRP, ABS, AN, BN)

where marital disruption is scored 1 if the man disrupted his marriage during the four-year interval, CAT is scored 1 if the man's family of origin was Catholic, AGLT20 is scored 1 when the husband contracted his first marriage before the age of 20, LRP is long-run permanent income, ABS is absolute earnings in year prior to period of observation, EL (expect less) is a dummy variable scored 1 if the man does better than his peers, EM (expect more) is a dummy scored 1 if a man does worse than his peers, AN (above normal) is scored 1 if a man is doing better than he normally

does, and BN (below normal) is scored 1 if a man is doing worse than he normally does. We estimate two equations because the two sets of income dummy variables tap different aspects of the extent to which a husband is conforming to his wife's expectations.

Table 1 presents the means and standard deviations of the variables in our model. We have chosen not to present a matrix of correlations of all the independent variables for each time period. However, before discussing the results, it is important to address the issue of multicollinearity among the earnings variables. First, the correlations between long-run permanent income and every other earnings variable are quite low, never exceeding .23. The other intercorrelations of the earnings variables vary dramatically between 0 and 0.6; the largest correlations occur between ABS and EL, EM.

Table 2 presents the results of one of our two logit models estimated for both four-year periods. The variable tapping sociocultural norms against marital disruption--whether the respondent's family was Catholic--has substantial negative effects in the first four years of marriage and weaker ones thereafter. The sign of the effect is in the expected direction. The diminished effect in the fifth through eighth years of marriage could be due to the fact that the more distant an individual is from his experience and socialization in the family of origin, the less powerful are the effects of norms and sanctions of that family of origin. Of course, it is also possible that the couple practices a different religion from the family of origin. It should be remembered that we chose to measure religion by religion in family of origin rather than religion at time of survey (around 35 years of age) because (1) a marital

Table 1

Means and Standard Deviations of Variables Used in the Analyses, by Four-Year Period

	Years 0-4		Years 5-8	
Variable	Mean	SD	Mean	SD
DISRUPTION	.0341	.182	.0367	.188
CAT	.390	.488	.395	.489
AGLT20	.084	.278	.0890	.285
LRP	183	118	185	120
ABS	45.9	31.2	76.0	37.1
EL	.312	.463	.240	.427
EM	.364	.481	.208	.406
AN	.531	.499	.172	.377
BN	.116	.319	.108	.310
N	3574		3156	

Table 2

Parameter Estimates from Logit Equations Predicting Marital Disruption in Years 0-4 and 5-8 of First Marriages

	Years 0-4	Years 5-8
CAT	-.0132**	-.009
	(-1.96)	(-1.260)
AGLT20	.0266***	.0185*
	(2.98)	(1.669)
LRP	-.0000946***	-.0000354
	(-2.54)	(-1.130)
ABS	.000018	.000377***
	(.104)	(3.435)
EL	.00378	-.015
	(.423)	(-1.454)
EM	.0151*	.0194***
	(1.679)	(2.687)
intercept	-.100***	-.139***
	(-8.325)	(-13.127)
$\bar{P}$	.0341	.0368
likelihood ratio test	27.350	15.068
(p value)	(.0003)	(.0351)
N	3574	3156

The logistic function was estimated by maximum likelihood techniques. The coefficients reported above are $B_i(P_i)(1 - \bar{P}_i)$, where $\bar{P}_i$ is indicated above for each interval. Asymptotic t-values for each B are shown in parentheses.

*** implies statistically different from zero at the .01 level
** implies statistically different from zero at the .05 level
* implies statistically different from zero at the .10 level

disruption could affect the religion of the respondent and (2) religion of the family of origin is more important than religion at age 37 for the social milieu in which the young married couple makes decisions. It is possible that, if we had a measure of religious preference at different times of marriage, the effect of religion might not diminish in the later years.

The effects of the husband's early age at marriage are in the expected direction, but are only statistically significant in the first four years of marriage. If the husband married before he was 20 years of age, his probability of marital disruption in the first four years of marriage is increased by .026, evaluated at the mean probability of .034. This effect is as expected (Ross and Sawhill, 1975; Sweet, 1972). There could be a number of explanations for the finding that the effect of the husband's early age at marriage later diminishes. First, one could posit a selectivity argument: early marriers face a very high likelihood of disruption in the early years of marriage, since they presumably have less time to find an optimal match. Some who marry young may nevertheless find very suitable partners, and if these are the couples that make it to the fourth year of marriage, we would expect the effect of a young age at marriage to decrease. It is also possible that some of the negative consequences of an early first marriage (e.g., a poor economic situation) diminish as the marriage proceeds.

In our theoretical section, we argued that it was necessary to study how different aspects of male earnings affected marital disruption over the course of the marriage. In addition to the effects of the absolute level of male earnings, we were interested in the effects of differential role performance and economic strain. The logits in Tables 2 and 3 begin to

Table 3

Parameter Estimates from Logit Equations Predicting Marital Disruption in Years 0-4 and 5-8 of First Marriages

	Years 0-4	Years 5-8
CAT	-.0137**	-.00989
	(-2.028)	(-1.386)
AGLT20	.0255**	.0167
	(2.283)	(1.578)
LRP	-.0000912**	.0000368
	(-2.439)	(-1.126)
ABS	-.000137	.000232**
	(-.440)	(-.0361)
AN	-.00322	.000338
	(-.440)	(-.0361)
BN	.000611	.0224*
	(.0550)	(1.901)
intercept	-.0854	-.128
	(-8.359)	(-13.867)
$\bar{P}$	.0341	.0368
likelihood ratio test	24.86	9.303
(p value)	(.0008)	(.231)
N	3574	3156

The logistic function was estimated by maximum likelihood techniques. The coefficients reported above are $B_i(P_i)(1 - \bar{P}_i)$, where $\bar{P}_i$ is indicated above for each interval. Asymptotic t-values for each B are shown in parentheses.

** implies statistically different from zero at the .05 level
* implies statistically different from zero at the .10 level

answer these questions. In the first four years of marriage, we find that (1) doing better than one's peers has no consequence for marital instability; (2) earning less than one's peers has a small positive effect (statistically significant at the 0.1 level) on marital instability; and (3) one's long-run permanent income has a very small but positive statistically significant effect on marital disruption. These results are not at all surprising and are, in fact, congruent with our earlier argument. It is likely that it is important whether the husband's role performance is poor relative to the norm (his peers) in the early stages of marriage. However, wives probably realize that, early in marriage, earnings are inherently unstable (and poor predictors of future role performance) because of the husband's involvement in school, military, or starting positions. All of these activities would tend to reduce his earnings and his earnings relative to those of his peers--but might increase his potential for fulfilling his role as breadwinner. It seems likely, therefore, that wives consider the long-run earnings prospects of their husbands as well as how they do relative to peers when judging role performance. In the equation predicting marital disruption in years 5 to 8 of the first marriage, long-run, permanent income has a small, statistically insignificant effect while doing poorly relative to one's peers exhibits a strong positive effect on marital instability: if the wife expects more earnings from her husband, the probability of disruption is increased by .019, evaluated at the mean probability of .037 disruption. Later in marriage, as involvement in schooling and the military is reduced, how one is doing

relative to one's peers is a better measure of role performance. Wives might, therefore, use this information instead of the long-run permanent income as an index of role performance. It is also possible that as the marriage "survives," wives are less willing to wait for "that long-run permanent income" to occur.

Absolute income does not have any substantial effects in the first four years of marriage. In the next four-year period, the level of a man's absolute earnings positively affects marital instability, net of his earnings relative to his peers and his long-run permanent income. Though statistically significant, this effect is small: a $1,000 increase in absolute earnings increases the probability of marital instability by .003, evaluted at the mean probability of disruption of .0360. Even though the effect is quite small, it is necessary to posit explanations for this effect, since it is not in the expected direction. First, it is possible that men with very high earnings may perceive great benefits from recontracting a marriage with another (more desirable) mate, since their high earnings make them a very attractive catch in the remarriage market. Second, Ross and Sawhill (1975) found that men who work extremely long hours have higher probabilities of marital instability, net of a number of social, demographic, and economic characteristics. Since working long hours also has a positive net effect on absolute level of earnings (Treiman and Terrell, 1975; Featherman and Hauser, 1976) and since we were unable to control for hours of work, absolute level of earnings could be tapping the effect of working excessive hours, when several other aspects of the husband's earnings are held constant.

Table 3 presents the logits where the measure of role performance is whether the husband's earnings for a given year are above or below his "normal earnings," as defined earlier. The parameter estimates of all the other variables in the model are quite stable. These measures of the husband's role performance exhibit the same general pattern as do the earlier measures of this concept, but the effects are considerably weaker. Apparently wives evaluate their husband's role performance more on how well he is doing relative to his peers than on whether he is doing more poorly than he usually does.

6. SUMMARY AND CONCLUSIONS

In summary, the probability that a man will end his first marriage within four years, and then between the fifth and eighth years, varies with respect to alternative indicators of his economic performance. The results suggest that a wife's evaluation of her husband's success as a breadwinner is a more important influence on marital disruption than either the absolute level of his current earnings or his permanent income. Because the analysis sample was restricted to predominantly white, high school graduates, these results do not necessarily refute the idea that absolute income levels are the predominant influence in the entire male population. On the other hand, Ross and Sawhill's study of a representative national sample of all couples produced findings that are generally consistent with our results and conclusions. A unique aspect of our findings is that they suggest that the effects of certain variables change as time since first marriage elapses. An income below the husband's four-year

average has little effect early in marriage, but later shortfalls substantially increase the likelihood of disruption. Similarly, earnings below that expected on the basis of the characteristics of peers become more important over time. Also, the absolute level of earnings prior to the second analysis period registers a stronger effect than it does prior to the first four years, while the opposite pattern holds for permanent income. The change in the effect of absolute income level might be due to recontracting by high-income men, or indicate one consequence of prolonged and excessive devotion to market work. We suspect that the effect of permanent income declines because, during the later stages of a marriage, the wife knows better what his permanent income is and hence primarily evalutes her husband's performance in relation to other criteria, such as the income of peers or his normal income. Finally, it is interesting that the religion of a man's family of origin gradually loses influence, as does his age at first marriage, although the latter probably results from a selectivity process.

To the extent that a particular welfare reform proposal would reduce income instability for two-parent families, these results suggest that marital instability would also be reduced somewhat. Similarly, any transfer programs that cushion economic shocks (e.g., unemployment insurance) will tend to promote family stability. However, the evidence of role performance effects also implies that the impact of redistribution policies may be limited, to the extent that a wife's perceptions of her husband's role performance are not altered. For instance, if all members of a particular reference group benefit equally, individual relative incomes remain constant, with no effect on marital harmony. Of course,

we have no evidence to assess how realistic this scenario might be, because our data do not permit separation of instability from role performance effects. To the extent that wives' perceptions are colored by feelings of welfare "stigma," the particulars of program design are crucial. To illustrate, programs that subsidize market work might be more stabilizing than traditional welfare programs, insofar as work-related benefits confer more "breadwinner" status. By the same token, making benefits universally available to all families may be less stigmatizing and more conducive to perceived economic security than existing income-tested programs.

In short, the evidence that both actual and perceived male economic performance affects marital instability suggests that social and psychological aspects of economic strategies to aid families deserve careful consideration.

NOTES

[1]Originally, we planned to analyze the probability of marital disruption in the first four two-year periods. However, the small number of individuals experiencing disruptions in two-year periods precluded such an analysis.

[2]A problem with our measurement of long-run, permanent income is that it utilized earnings information subsequent to the marital disruption for the small portion of the sample who experienced marital instability. Other possible measurement strategies were equally problematic. In particular, one possible strategy is to (1) pool across time periods, (2) estimate an earnings model which provides (among other things) parameters for each individual (Balestra and Nerlove, 1966; Nerlove, 1971) and (3) obtain an income expected at age 45 by using the parameters in the earnings model, the parameter for the individual, and substituting in the individual's values using 45 as his age. If we did this we could only want to use earnings data prior to the disruption when estimating the model and obtaining the individual parameters. Since many marriages disrupted prior to 1960, we would have only one or two years with which to obtain the individual parameters for a proportion of the disruptions. Parameters based on fewer than three or four observations are quite meaningless, thus making this strategy, as a whole, quite inadequate. Although our permanent income measure has some problems, it is clearly superior to other available strategies.

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